



State of New Hampshire
DEPARTMENT OF ENVIRONMENTAL SERVICES

6 Hazen Drive, P.O. Box 95, Concord, NH 03302-0095
(603) 271-3406 FAX (603) 271-7894



Mr. John Colony, Jr.
Harrisville, NH 03450

June 18, 2002
Letter of Deficiency
DAM #166.04

RE: Nubanusit Lake Dam, Nelson

Dear Mr. Colony:

The Department of Environmental Services, Dam Bureau (DES) consistently strives to enhance the safety of dams in New Hampshire through its dam safety program. One of the many instruments that plays a part in reaching this goal is our inspection program. DES is forwarding this correspondence to you to advise you that in accordance with RSA 482:12 and Env-Wr 502.02, an inspection of the subject dam was conducted on December 27, 2001. During this visual inspection and/or file review, the following deficiencies were observed:

- The right embankment crest is uneven and appears to drop off in elevation from the gatehouse to the right abutment;
2. There is substantial erosion of the upstream face of the dam both to the right and left of the gatehouse. The upstream face of the dam is steep and has no riprap protection; and
3. There is tree and brush growth on both the upstream and downstream faces to the right embankment;
4. The crest of the right embankment adjacent to the gatehouse has been eroded and lowered due to foot traffic;
5. The crest of the left embankment has been eroded due to foot traffic on both the upstream and downstream faces of the dam;
6. There are trees and brush on the upstream and downstream faces of the left embankment;
7. The pool at inspection was 9.6 feet as measured on the staff gage located on the upstream right spillway training wall;
8. The Emergency Action Plan (EAP) has not been updated and tested; and
9. The operation and maintenance plan (O&M) currently on file with the DES may require updating or revision.

DES believes that the above deficiencies can be corrected by performing the following items by the indicated schedule:

September 1, 2002:

1. Survey and repair, as necessary, the embankment crest where it has settled, especially the right embankment near the right abutment;

Letter of Deficiency
Dam #166.04
June 18, 2002
pg. 2

2. Re-grade the upstream face of the earth embankments to a minimum of 2.5:1 slope and install appropriate erosion protection;
3. Re-grade the crest of the dam making sure to repair the foot traffic erosion adjacent to both the right and left sides of the gatehouse;
4. Remove all tree and brush growth from the right and left embankments to a distance of at least 10 feet from the toe and abutments of the dam;

Update and test the EAP; and

6. DES also requests that you update and/or revise your existing O&M plan. Refer to the enclosed copy for your reference.

Due to the time that has lapsed as well as additional deficiencies observed as a result of the December 27, 2001 inspection, DES will be officially closing out the 1998 LOD. Enclosed is a copy for your reference. It is our hope that the additional deficiencies as well as the outstanding deficiencies will be addressed within the schedule indicated above.

DES is requesting that you complete and submit the attached "Intent to Complete Repairs" form, within 30 days of receipt of this letter, that will provide for correction of the identified deficiencies by the date(s) indicated above. If you believe changes to the items of work or dates are necessary, please make the changes directly on the form and provide a brief explanation. We have enclosed a self addressed stamped envelope for you to return this form.

Our intent in sending you this correspondence is to make you aware of items that DES believes warrant your attention to insure the continued safe operation of your dam. It is our hope that, through the submittal of the attached form and a commitment to keeping a well-maintained dam, you will voluntarily comply with the requested items of work. If we do not receive the intent form or a similarly adequate written reply, we will assume that you are in agreement with our findings and recommendations and DES will carry out follow-up inspections accordingly.

If you have any questions or comments regarding this Letter of Deficiency or would like to be present at future inspections, please contact me at 271-3406, or write to the Water Division at the address listed on the top of the previous page.

Sincerely,

COPY
Jeffrey M. Blaney
Dam Safety Engineer

Attachments Copy of 1998 LOD, Copy of Existing O&M Plan, DB8, DB13

cc: Gretchen Rule

Town of Nelson

Certified # 7000 1670 0000 0586 0394

JMB/was/h:/safety/wendy/lod/166-04lod.doc